

Amendments to the Claims:

This listing of the claims will replace all prior versions and listings of claims in the application.

1. (Currently amended) A communication network operating to support voice and data communication within a premises, said communication network comprising:

a plurality of mobile network devices ~~having comprising~~ a buffer that stores incoming digital voice information for a predetermined queuing period before beginning voice reproduction from the stored digital voice information;

a stationary network device;

a wireless network that is used by each of said plurality of mobile network devices to selectively exchange voice and data packets with others of the plurality of mobile network devices;

a hardwired network connected to both said stationary network device and said wireless network;

said hardwired network being used to route voice and data packets between said stationary network device and said plurality of mobile network devices which participate via said wireless network;

a telephone, connected to said stationary network device, that captures, delivers, receives and reproduces voice in an analog voice stream form;

said stationary network device ~~having comprising~~ a buffer that stores digital voice information received from said wireless network for a predetermined queuing period before converting the stored digital voice information into an analog voice stream and delivering the analog voice stream to said telephone; and

said stationary network device converts analog voice streams received from said telephone into voice packets for delivery via said hardwired and wireless networks to a selected one of said plurality of mobile network devices.

2. (Previously presented) The communication network of claim 1 wherein the predetermined queuing period is determined through examining delays found in test signal routing.
3. (Previously presented) The communication network of claim 1 wherein said stationary network device is a computer.
4. (Previously presented) The communication network of claim 1 wherein said wireless network utilizes a polling protocol and spanning tree routing.
5. (Previously presented) The communication network of claim 1 wherein said stationary network device provides call setup assistance for said telephone.
6. (Previously presented) The communication network of claim 1 further comprising:
 - a telephone switching network connected to said stationary network device; and
 - said stationary network device selectively routes analog voice streams received from said telephone onto said telephone switching network, and said stationary network device selectively routes analog voice streams received from said telephone switching network to said telephone.
7. (Currently amended) A communication network located within a premises for supporting voice and data exchanges, said communication network comprising:
 - a plurality of portable terminals, each having comprising a wireless transceiver;
 - each of said plurality of portable terminals capture voice in an analog voice stream form and generate therefrom digital voice packets, and each of said plurality of portable terminals receive digital voice packets, generate therefrom analog voice streams, and reproduce voice from the analog voice streams;
 - each of said plurality of portable terminals capture data and generate therefrom data packets, and each of said plurality of portable terminals receive data packets and reproduce data from the data packets received;
 - a plurality of access devices, each having comprising a wireless transceiver; and

said plurality of access devices using a polling protocol to manage wireless routing of data and voice packets within the premises among said plurality of portable terminals.

8. (Previously presented) The communication network of claim 7 wherein said plurality of access devices utilize spanning tree routing for both data and voice packets.

9. (Currently amended) The communication network of claim 7 further comprising:

a telephone, connected to one of said plurality of access devices, that captures, delivers, receives and reproduces voice in an analog voice stream form;

said one of said plurality of access devices selectively converting digital voice packets received into an analog voice stream for delivery to said telephone for reproduction; and

said one of said plurality of access devices selectively converting an analog voice streamsstream received from said telephone into digital voice packets for delivery to one of said plurality of portable terminals.

10. (Previously presented) The communication network of claim 9 further comprising:

a telephone switching network connected to said one of said plurality of access devices;

said one of said plurality of access devices selectively routes analog voice streams received from said telephone through said telephone switching network; and

said one of said plurality of access devices selectively routes analog voice streams received from said telephone switching network to said telephone.

11. (Currently amended) The communication network of claim 10 wherein said one of said plurality of access devices provides call setup assistance for said telephone.

12. (Previously presented) The communication network of claim 10 wherein said one of said access devices stores incoming digital voice packets for a queuing time period before converting the digital voice packets into an analog voice stream form.

13. (Previously presented) The communication network of claim 7 further comprising:
 - a telephone switching network connected to one of said plurality of access devices;
 - said one of said plurality of access devices selectively converts digital voice packets received into an analog voice stream form for routing through said telephone switching network; and
 - said one of said plurality of access devices selectively converts analog voice streams received from said telephone switching network into digital voice packets for routing to select ones of said plurality of portable terminals.
14. (Previously presented) The communication network of claim 13 wherein said one of said access devices selectively provides call setup assistance to interface with said telephone switching network.
15. (Currently amended) A communication network for supporting voice exchanges, said communication network comprising:
 - a voice stream network that selectively routes voice signals captured in an analog voice stream form;
 - a voice packet network, independent of said first-voice stream network, that selectively routes voice in a digital voice packet form;
 - a first network device that captures and delivers voice in the analog voice streams stream form, and said first network device receives and reproduces voice from the analog voice stream form;
 - a second network device, independent of said first network device, that communicatively couples with said first network device to receive and deliver voice in the analog voice stream form;
 - said second network device selectively interfaces with said voice stream network to receive and route voice for said first network device in the analog voice stream form;

said second network device selectively interfaces with said voice packet network to receive and route voice for said first network device in the digital voice packet form; and

 said second network device converts voice between the analog voice stream form and the digital voice packet form when needed for routing voice between said first network device and said voice packet network.

16. (Currently amended) The communication network of claim 15 wherein said voice stream network ~~comprising~~comprises a telephone switching network.

17. (Previously presented) The communication network of claim 16 wherein said voice packet network uses a polling protocol and incorporates spanning tree routing.

18. (Previously presented) The communication network of claim 15 wherein said first network device is a telephone that captures, delivers, receives and reproduces voice in an analog voice stream form.

19. (Previously presented) The communication network of claim 18 wherein said second network device is a computer.

20. (Currently amended) The communication network of claim 19 wherein ~~said first network device is a telephone that captures, delivers, receives and reproduces voice in an analog voice stream form, and said voice packet network comprises an internet~~Internet switching network.

21. (Previously presented) The communication network of claim 15 wherein said second network device is an access device.

22. (New) At least one circuit for use in a mobile communication device for use in a communication network, the communication network operating to support voice and data communication and having at least a stationary network device communicatively coupled to a telephone, a wireless network operable to exchange voice and data packets with a plurality of mobile communication devices, and a hardwired network communicatively coupled to the

stationary network device and the wireless network and operable to route voice and data packets between the stationary network device and the plurality of mobile communication devices via at least the wireless network, the at least one circuit operational to, at least:

selectively exchange voice and data packets with other mobile communication devices via at least the wireless network;

transmit digital voice information to the stationary network device through at least the wireless and hardwired networks, the transmitted digital voice information for buffering by the stationary network device for a predetermined queuing period before conversion to an analog voice stream and deliverance to the telephone;

receive digital voice information from the stationary network device through at least the hardwired and wireless networks, the received digital voice information converted by the stationary network device from an analog voice stream received from the telephone into voice packets for delivery to the mobile communication device; and

store the received digital voice information in a buffer for a predetermined queuing period before beginning voice reproduction from the stored received digital voice information.

23. (New) The at least one circuit of claim 22, where the predetermined queuing period is determined through examining delays found in test signal routing.

24. (New) The at least one circuit of claim 22, where the stationary network device is a computer.

25. (New) The at least one circuit of claim 22, where the wireless network utilizes a polling protocol and spanning tree routing.

26. (New) The at least one circuit of claim 22, where the stationary network device provides call setup assistance for the telephone.

27. (New) The at least one circuit of claim 22, where the communication network further has at least a telephone switching network communicatively coupled to the stationary network device, the stationary network device selectively routes analog voice streams received from the

telephone onto the telephone switching network, and the stationary network device selectively routes analog voice streams received from the telephone switching network to the telephone.

28. (New) At least one circuit for use in a mobile communication device for use in a communication network, the communication network operating to support voice and data communication and having at least a plurality of access devices, where each access device has a wireless transceiver, and the plurality of access devices use a polling protocol to manage wireless routing of data and voice packets among a plurality of mobile communication devices, the at least one circuit operational to, at least:

capture voice in an analog voice stream form and generate digital voice packets from the captured voice;

receive digital voice packets, generate analog voice streams from the received digital voice packets, and reproduce voice from the generated analog voice streams;

capture data and generate data packets from the captured data; and

receive data packets and reproduce data from the received data packets.

29. (New) The at least one circuit of claim 28, where the plurality of access devices utilize spanning tree routing for both data and voice packets.

30. (New) The at least one circuit of claim 28, the communication network further having, at least, a telephone, connected to one of the plurality of access devices, that captures, delivers, receives and reproduces voice in an analog voice stream form, where the one of the plurality of access devices selectively converts digital voice packets received into an analog voice stream for delivery to the telephone for reproduction, and the one of the plurality of access devices selectively converts an analog voice stream received from the telephone into digital voice packets for delivery to one of the plurality of mobile communication devices.

31. (New) The at least one circuit of claim 30, the communication network further having, at least, a telephone switching network connected to the one of the plurality of access devices, where the one of the plurality of access devices selectively routes an analog voice stream received from the telephone through the telephone switching network, and the one of the

plurality of access devices selectively routes an analog voice stream received from the telephone switching network to the telephone.

32. (New) The at least one circuit of claim 31, where the one of the access devices provides call setup assistance for the telephone.

33. (New) The at least one circuit of claim 31, where the one of the access devices stores incoming digital voice packets for a queuing time period before converting the digital voice packets into an analog voice stream form.

34. (New) The at least one circuit of claim 28, the communication network further having, at least, a telephone switching network connected to one of the plurality of access devices, where the one of the plurality of access devices selectively converts digital voice packets received into an analog voice stream form for routing through the telephone switching network, and the one of the plurality of access devices selectively converts an analog voice stream received from the telephone switching network into digital voice packets for routing to select ones of the plurality of mobile communication devices.

35. (New) The at least one circuit of claim 34, where the one of the plurality of access devices selectively provides call setup assistance to interface with the telephone switching network.

36. (New) At least one circuit for use in a communication device for use in a communication network, the communication network supporting voice exchanges and having at least a voice stream network that selectively routes voice signals captured in an analog voice stream form, and a voice packet network independent of the voice stream network that selectively routes voice in a digital voice packet form, the at least one circuit operational to, at least:

communicatively couple with a first network device to receive and deliver voice in the analog voice stream form, the first network device operational to capture and deliver voice in the analog voice stream form and receive and reproduce voice from the analog voice stream form;

selectively interface with the voice stream network to receive and route voice for the first network device in the analog voice stream form;

selectively interface with the voice packet network to receive and route voice for the first network device in the digital voice packet form; and

convert voice between the analog voice stream form and the digital voice packet form when needed for routing voice between the first network device and the voice packet network.

37. (New) The at least one circuit of claim 36, where the voice stream network has at least a telephone switching network.

38. (New) The at least one circuit of claim 37, where the voice packet network uses a polling protocol and incorporates spanning tree routing.

39. (New) The at least one circuit of claim 36, where the first network device is a telephone that captures, delivers, receives and reproduces voice in an analog voice stream form.

40. (New) The at least one circuit of claim 36, where the communication device is a computer.

41. (New) The at least one circuit of claim 40, where the first network device is a telephone that captures, delivers, receives and reproduces voice in an analog voice stream form, and the voice packet network includes an Internet switching network.

42. (New) The at least one circuit of claim 36, where the communication device is an access device.